



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
08/838,452	04/07/1997	WARREN M. FARNWORTH	91-62.17	8883

7590

06/11/2002

STEPHEN A GRATTON
2764 SOUTH BAUN WAY
LAKEWOOD, CO 80228

EXAMINER

KARLSEN, ERNEST F

ART UNIT

PAPER NUMBER

2829

DATE MAILED: 06/11/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

08/838452

Applicant(s)

FARNWORTH ET AL

Examiner

E. KARLSEN

Group Art Unit

2829

—The MAILING DATE of this communication appears on the cover sheet beneath the correspondence address—

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, such period shall, by default, expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

☒ Responsive to communication(s) filed on MARCH 28, 2002

☐ This action is FINAL.

☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

Disposition of Claims

☒ Claim(s) 78-83, 87-98 is/are pending in the application.

Of the above claim(s) 83, 89, 94, 95 is/are withdrawn from consideration.

☐ Claim(s) _____ is/are allowed.

☒ Claim(s) 78-82, 87, 88, 90-93, 96-98 is/are rejected.

☐ Claim(s) _____ is/are objected to.

☐ Claim(s) _____ are subject to restriction or election requirement

Application Papers

☐ The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.

☐ The drawing(s) filed on _____ is/are objected to by the Examiner

☐ The specification is objected to by the Examiner.

☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119 (a)-(d)

☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119 (a)-(d).

☐ All ☐ Some* ☐ None of the:

☐ Certified copies of the priority documents have been received.

☐ Certified copies of the priority documents have been received in Application No. _____.

☐ Copies of the certified copies of the priority documents have been received

in this national stage application from the International Bureau (PCT Rule 17.2(a))

*Certified copies not received: _____

Attachment(s)

☐ Information Disclosure Statement(s), PTO-1449, Paper No(s). _____

☐ Interview Summary, PTO-413

☒ Notice of Reference(s) Cited, PTO-892

☐ Notice of Informal Patent Application, PTO-152

☐ Notice of Draftsperson's Patent Drawing Review, PTO-948

☐ Other _____

Office Action Summary

Art Unit: 2858

1. Due to the location of a new reference the Final Rejection of October 5, 2001 is withdrawn and the following substituted therefor:
2. Claims 83, 89, 94 and 95 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b) as being drawn to a non-elected invention and/or species. Election was made **without** traverse in Paper No. 22.
3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --
4. (e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.
5. Claims 78-82, 87, 88, 90-93 and 96-98 are rejected under 35 U.S.C. 102(e) as being fully anticipated by Agahdel et al.
6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.
7. Claims 78-82, 87, 88, 90-93 and 96-98 are rejected under 35 U.S.C. 103(a) as being unpatentable over Malhi et al '190 or Elder et al '850 in a first set in view of Nakano in a second set and Blonder et al or Bindra et al in a third set.

Art Unit: 2858

The first set shows all the major elements of the claimed invention except for the specific contacts and a clamping mechanism producing a specific force range. The first set does have a clamping mechanism. The second set shows a contact of the type claimed except it has a single raised portion instead of plural raised portions. The third set shows the use of contacts with plural raised portions. It would have been obvious to one of ordinary skill in the art at the time the invention was made to have adapted the contact structure of the second set modified to have plural raised portions in accord with the third set to the apparatus of the first set because one of ordinary skill in the art would realize that so doing would result in better contact being made. . The force ranges claimed are considered obvious to one skilled in the art and would be scaled appropriately for that being tested. Applicants' arguments that Nakano has no clamping mechanism are contested by the examiner. No drawing exists in Nakano showing a clamping mechanism, but Nakano indicates that the probe of figure 2a "butts up against pad 25" and "deep scoring of pad 25 by probe contact 22 is prevented". (See page 5, lines 17 plus of Nakano et al.) Something has to force the probe against that being tested. It might be a weight, a press or a clamp. All would seem equivalent and obvious to one skilled in the art. Note that the first set uses clamps. Both Blonder et al and Bindra et al must use something akin to a clamp to hold the parts together. Anything that is held together is "clamped". The size of the "clamp" is not relevant.

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

Art Unit: 2858

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. Claims 78-82, 87, 88, 90-93 and 96-98 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nakano in a first set in view of Blonder et al or Bindra et al in a second set.

The references were all discussed above. Note Figure 4 of the first set where a plate 40 bears a substrate 10. The plate 40 has external contacts 41. Lines 3 and 4 of page 2 of the first set state that wafers or chips may be tested. It would have been obvious to one of ordinary skill in the art at the time of the invention to have adapted raised portion features of the contacts of the second set to the apparatus of the first set because one skilled in the art would realize that such would enable better contact. One skilled in the art would realize that the chip and the test probe would have to be held together somehow, as by a clamp mechanism. One skilled in the art would apply a force sufficient to make good contact and not so great as to destroy that being tested. Applicants' claimed ranges fall within that category.

10. Applicants argue the rejections as if the references stand alone. The rejection in each of the above rejections is a rejection based on a combination of references. In the rejection of paragraph 7 the rejection is that with the teaching of the second set and third set it would be obvious to modify the first set to have penetration limiting contacts as in the second set and to have plural penetrating contacts as shown by the penetration limiting plural contacts of the third set. The rejection of paragraph 9 drops the first set of the rejection of paragraph 7 and uses just the second set and the third set of paragraph 7 which in the rejection of paragraph 9 became the

Art Unit: 2858

first set and second set. With regard to the argument that a press with a hydraulic cylinder is not a clamp, it is the examiner's position that such a device would be a clamp. A clamp is merely a device for compressing structural or mechanical parts. The worlds largest press and a paper clip are both clamps.

11. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

12. Claims 78-82, 87, 88, 90-93 and 96-98 are rejected under 35 U.S.C. 103(a) as being unpatentable over Agahdel et al.

It would have been obvious to one of ordinary skill in the art to apply a force magnitude to the apparatus of Agahdel et al and to use dimensions in the structure of Agahdel et al such that proper results could be obtained without damage to that which is being tested.

Karlsen/ds

06/09/02


ERNEST KARLSEN
PRIMARY EXAMINER